

ABSTRACT OF THE DISCLOSURE

A selector transmission for a motor vehicle that includes a single input shaft, first and second countershafts and a reverse shaft with fixed gears on the input shaft engaged with idler gears on the countershafts and reverse shaft. The idler gears are selectively coupled to their shafts by coupling devices to select among six forward and one reverse gear and include gears engaging an output shaft and at least one input shaft gear is shared among two shift ratios. The gear ratios are arranged along the shafts in a non-consecutive order, with regard to a gear ratio order in an H shifting gate, and the transmission includes a mechanical conversion device which converts consecutive gear ratio shift lever movements in an H shifting gate into actuation movements for the coupling devices.

[012] In the shifting device 50 shown in Fig. 2, a transmission shift lever 52 is led into the HH shifting gate 51 and is coupled with a mechanical conversion device 50C that includes ↔ ↔ [[with]] two transmission selector shafts 53, 54 so that a movement of the shift lever 52 to a shifting gate 55 results in a swiveling of the selector shaft 53 around its longitudinal axis. In addition, a first gear wheel 56 is fastened on the first selector shaft 53 which meshes with a second gear wheel 57 upon the second selector shaft 54. During a revolution of the first selector shaft 53, the second selector shaft 54 rotates, therefore, in the opposite direction. During selection of a shifting gate by the transmission selector lever 52 in a selector gate 58, the two selector shafts 53, 54, compulsorily coupled, are moved parallel with their longitudinal axis.

[034] As can be understood from Fig. 1, the coupling devices 29, 30, 31 are situated, respectively, between two transmission gears G2, G4; G3, G1 and RG, G6 which, in an H or multi-H shifting gate, do not form consecutive transmission gears in a common shifting gate. Thereby the customary shift actuation devices with which the coupling devices 29, 30, 31, 32 are axially moved upon the countershafts 15, 16 cannot be easily used for this transmission 1. Therefore, ↔ for such a six-gear transmission, a mechanical conversion device 50C, shown by way of example in Fig. 2 and already described in detail above, is advantageously used.